



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/841,136	04/24/2001	Jeffrey Douglas Haggar	RSW920010029US1	6044

7590 09/23/2004

Jerry W. Herndon
IBM Corporation T81/503
P.O. Box 12195
Research Triangle Park, NC 27709

EXAMINER

PEARSON, YVETTE B

ART UNIT

PAPER NUMBER

2144

DATE MAILED: 09/23/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/841,136

Applicant(s)

HAGGAR ET AL.

Examiner

Yvette Pearson

Art Unit

2144

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 24 April 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-19 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-19 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

1. Claims 1-19 are presented for examination in the application.

Acknowledgement is made of Information Disclosure document filed April 24, 2001.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that forms the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1-3, 5-9 and 11-13 are rejected under 35 U.S.C. 102(b) as being anticipated by Hemmady et al (US 4,872,159).
4. As per Claims 1, 5, 8, and 11 Hemmady teaches a method of rapid response for data networking (data transfer) on ports associated with a user to an authorized destination in the same group (virtual network) [Column 2, Lines 31-34], comprising: a) Hub(s) that include a plurality of data switching modules followed by a stage of circuit switching (network addressing) (Column 2, Line 41), b) buffering of network transactions (Column 9, Line 20), c) utilizing header information generated by internal link handlers to move data; (Fig 10) and d) allows data packets destined for a common

Art Unit: 2144

output to be chained so that they may be all transmitted together. (Column 7, Lines 54-57.)

Thus Hemmady discloses all limitations of the rejected claim and therefore anticipates the claims subject matter of claims 1, 5, 8 and 11.

5. As per Claims 2, 3 and 9, Hemmady teaches a user interface module that serves as a direct memory access port and a buffer for transactions received (Column 6, Lines 29-33). Hemmady further teaches a method of storing information moving from the Network Interface Module to the Memory and Interface Module (MINT) whereby the header information is copied by the external link handlers and sent to the MINT control for processing (Column 9, Lines 5-6).

Thus Hemmady discloses all limitations of the rejected claim and therefore anticipates the claims subject matter of claims 2, 3 and 9.

6. As per Claims 6 and 12, Hemmady teaches a systems whereby every network transaction maintains a header with a source port number to the Network Interface Module (Figure 20) that uses this number to complete the routing to the destination end user (Column 16, lines 43-54).

Thus Hemmady discloses all limitations of the rejected claim and therefore anticipates the claims subject matter of claims 6 and 12.

7. As per Claims 7 and 13, Hemmady teaches a systems, whereby the buffer

Art Unit: 2144

memory of the MINT provides efficient streaming of data to and from the link handlers (Fig 11). The internal link handler maintains a register containing the next address and count that allows a series of blocks to be read from memory in a continuous stream (Column 32, Lines 1-6).

Thus Hemmady discloses all limitations of the rejected claim and therefore anticipates the claims subject matter of claims 7 and 13.

Claim Rejections - 35 USC § 103

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. Claims 14-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hemmady (US 4872159).

With respect to Claims 14-19, Haggar discloses the invention as claimed, detailed above with respect to Claims 1, 5, 8 and 11; however, Haggar does not particularly disclose a computer program product on one or more computer readable media as being claimed in Claims 1, 5, 8 and 11. However, one of ordinary skill in the

Art Unit: 2144

art would have recognized that computer readable media (i.e. floppy, cd-rom, etc.) would provide as a computer program product for implementing a method, because it would facilitate the transporting and installing of the method on a system. For example, a copy of the Microsoft Windows operating system can be found on a CD-ROM from which Windows can be installed onto other systems, which is more practical than a physical cable connection or manually entering the software. Therefore, it would have been obvious to put Haggar's program on a computer readable media to facilitate transporting, installing and implementing Haggar's program on other systems.

10. Claims 4 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hemmandy (US 4872159) in view of Munter (US 6,141,738).

With respect to Claims 4 and 10, Hammady et al, teaches a system of rapid response for data networking (data transfer) on ports associated with a user to an authorized destination in the same group (virtual network) [Col 2, Line 31-35], but fails to specifically teach a virtual network defined by a plurality of logical partitions within a single computing device. However, Munter discloses a similar address translation method utilizing a forward table data structure (Figs 3A – 3L) and a memory optimization process, which are essentially customized to hardware [to provide a data structure and an address translation method that improves translation/routing performance in a data communications system (Col 3, Line 46)].

Therefore, it would have been obvious to one having ordinary skill in the art at the time of invention by applicant given their previous use in data communications, the advantage of improvement of virtual networking having the teachings of Hemmandy and Munter before one. The combination would teach a system of efficient data communications in a network that services a wide range of distributed users, whereby data packet forwarding rates are one of three main factors that contribute to the speed of traffic over the internet as taught by Munter (Col 1, Lines 17 – 24).

Conclusion

11. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

US 5,522,045, (Sandberg) discloses a method of managing virtual memory among interconnected computer nodes.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Yvette Pearson whose telephone number is 571-272-4227. The examiner can normally be reached on 8:30am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bill Cuchlinski can be reached on 571-272-3925. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 2144

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Yvette Pearson

Examiner

Art Unit 2144



WILLIAM A. CUCHLINSKI, JR.
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600